

03/16/01

03-19-01

PTO/SB/05 (08-00)

Please type a plus sign (+) inside this box

Approved for use through 10/31/2002. OMB 0651-0032  
U.S. Patent and Trademark Office; U.S. DEPARTMENT OF COMMERCE

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**UTILITY  
PATENT APPLICATION  
TRANSMITTAL**

(Only for new nonprovisional applications under 37 CFR 1.53(b))

|                        |  |
|------------------------|--|
| Attorney Docket No.    | BIOT 100   |
| First Inventor         | Carl Arne Krister Borrebaeck                                       |
| Title                  | METHODS OF MAKING AND USING MICROARRAYS<br>OF BIOLOGICAL MATERIALS |
| Express Mail Label No. | EL 709 416 588 US  |

**APPLICATION ELEMENTS**

See MPEP chapter 600 concerning utility patent application contents.

1. ☒ Fee Transmittal Form (e.g., PTO/SB/17)  
(Submit an original and a duplicate for fee processing)
2. ☐ Applicant claims small entity status.  
See 37 CFR 1.27.
3. ☒ Specification [Total Pages 38]  
(preferred arrangement set forth below)
  - Descriptive title of the invention
  - Cross Reference to Related Applications
  - Statement Regarding Fed sponsored R & D
  - Reference to sequence listing, a table, or a computer program listing appendix
  - Background of the Invention
  - Brief Summary of the Invention
  - Brief Description of the Drawings (if filed)
  - Detailed Description
  - Claim(s)
  - Abstract of the Disclosure
4. ☐ Drawing(s) (35 U.S.C. 113) [Total Sheets ☐]
5. Oath or Declaration [Total Pages 2]
  - a. ☒ Unexecuted
  - b. ☐ Copy from a prior application (37 CFR 1.63 (d))  
(for continuation/divisional with Box 17 completed)
    - i. ☐ **DELETION OF INVENTOR(S)**  
Signed statement attached deleting inventor(s)  
named in the prior application, see 37 CFR  
1.63(d)(2) and 1.33(b).
6. ☐ Application Data Sheet. See 37 CFR 1.76

**ADDRESS TO:**Assistant Commissioner for Patents  
Box Patent Application  
Washington, DC 20231

7. ☐ CD-ROM or CD-R in duplicate, large table or  
Computer Program (Appendix)
8. Nucleotide and/or Amino Acid Sequence Submission  
(if applicable, all necessary)
  - a. ☐ Computer Readable Form (CRF)
  - b. Specification Sequence Listing on:
    - i. ☐ CD-ROM or CD-R (2 copies); or
    - ii. ☐ paper
  - c. ☐ Statements verifying identity of above copies

**ACCOMPANYING APPLICATION PARTS**

9. ☐ Assignment Papers (cover sheet & document(s))
10. ☐ 37 CFR 3.73(b) Statement ☐ Power of  
(when there is an assignee) Attorney
11. ☐ English Translation Document (if applicable)
12. ☐ Information Disclosure ☐ Copies of IDS  
Statement (IDS)/PTO-1449 Citations
13. ☐ Preliminary Amendment
14. ☒ Return Receipt Postcard (MPEP 503)  
(Should be specifically itemized)
15. ☐ Certified Copy of Priority Document(s)  
(if foreign priority is claimed)
16. ☒ Other: Check for \$818.00  
Unexecuted (a) Power of Attorney, and (b) Statement  
Under 37 C.F.R. Section 3.73(b)

17. If a CONTINUING APPLICATION, check appropriate box, and supply the requisite information below and in a preliminary amendment, or in an Application Data Sheet under 37 CFR 1.76:

☐ Continuation ☐ Divisional ☐ Continuation-in-part (CIP)

of prior application No. \_\_\_\_\_ / \_\_\_\_\_

Prior application information

Examiner \_\_\_\_\_

Group / Art Unit \_\_\_\_\_

For CONTINUATION OR DIVISIONAL APPS only: The entire disclosure of the prior application, from which an oath or declaration is supplied under Box 5b, is considered a part of the disclosure of the accompanying continuation or divisional application and is hereby incorporated by reference. The incorporation can only be relied upon when a portion of the disclosure is intentionally omitted from the submitted application parts.

**18. CORRESPONDENCE ADDRESS**☒ Customer Number or Bar Code Label

23579

or ☐ Correspondence address below

PATENT TRADEMARK OFFICE

|         |  |           |                |          |                |
|---------|--|-----------|----------------|----------|----------------|
| Name    | Patrea L. Pabst<br>Arnall Golden & Gregory, LLP        |           |                |          |                |
| Address | 2800 One Atlantic Center<br>1201 West Peachtree Street |           |                |          |                |
| City    | Atlanta  | State     | GA             | Zip Code | 30309-3450     |
| Country | United States  | Telephone | (404) 873-8794 | Fax      | (404) 873-8795 |

|                   |                 |                                   |         |
|-------------------|-----------------|-----------------------------------|---------|
| Name (Print/Type) | Patrea L. Pabst | Registration No. (Attorney/Agent) | 31,284  |
| Signature         |                 | Date                              | 3/16/01 |

Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending upon the needs of the individual case. Any comments on the amount of time you are required to complete this form should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, Washington, DC 20231. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Assistant Commissioner for Patents, Box Patent Application, Washington, DC 20231.

BIOT/P22421US BIOT 100 11321/11

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# FEE TRANSMITTAL for FY 2001

Patent fees are subject to annual revision.

TOTAL AMOUNT OF PAYMENT (\$818.00)

**Complete if Known**

|                      |                              |
|----------------------|------------------------------|
| Application Number   |                              |
| Filing Date          | March 16, 2001               |
| First Named Inventor | Carl Arne Krister Borrebaeck |
| Examiner Name        |                              |
| Group Art Unit       |                              |
| Attorney Docket No.  | BIOT 100                     |

**METHOD OF PAYMENT (check one)**

1. ☐ The Commissioner is hereby authorized to charge indicated fees and credit any overpayments to.
- Deposit Account Number: 01-2507
- Deposit Account Name: Arnall Golden & Gregory, LLP
- ☒ Charge Any Additional Fee Required Under 37 CFR 1.16 and 1.17
- ☐ Applicant claims small entity status See 37 CFR 1.27

2. ☒ **Payment Enclosed:**
- ☒ Check ☐ Credit card ☐ Money Order ☐ Other

**FEE CALCULATION****1. BASIC FILING FEE**

| Large Entity Fee Code (\$) | Small Entity Fee Code (\$) | Fee Description        | Fee Paid |
|----------------------------|----------------------------|------------------------|----------|
| 101 710                    | 201 355                    | Utility filing fee     | 710.00   |
| 106 320                    | 206 160                    | Design filing fee      |          |
| 107 490                    | 207 245                    | Plant filing fee       |          |
| 108 710                    | 208 355                    | Reissue filing fee     |          |
| 114 150                    | 214 75                     | Provisional filing fee |          |

SUBTOTAL (1) (\$710.00)

**2. EXTRA CLAIM FEES**

Total Claims: 26 - 20 = 6 × Fee from below 18.00 = 108.00

Independent Claims: 3 - 3 = 0 × =

Multiple Dependent: × =

| Large Entity Fee Code (\$) | Small Entity Fee Code (\$) | Fee Description  |
|----------------------------|----------------------------|--|
| 103 18                     | 203 9                      | Claims in excess of 20                                     |
| 102 80                     | 202 40                     | Independent claims in excess of 3                          |
| 104 270                    | 204 135                    | Multiple dependent claim, if not paid                      |
| 109 80                     | 209 40                     | ** Reissue independent claims over original patent         |
| 110 18                     | 210 9                      | ** Reissue claims in excess of 20 and over original patent |

SUBTOTAL (2) (\$108.00)

**FEE CALCULATION (continued)****3. ADDITIONAL FEES**

| Large Entity Fee Code (\$) | Small Entity Fee Code (\$) | Fee Description  | Fee Paid |
|----------------------------|----------------------------|--|----------|
| 105 130                    | 205 65                     | Surcharge - late filing fee or oath  |          |
| 127 50                     | 227 25                     | Surcharge - late provisional filing fee or cover sheet                     |          |
| 139 130                    | 139 130                    | Non-English specification  |          |
| 147 2,520                  | 147 2,520                  | For filing a request for <i>ex parte</i> reexamination                     |          |
| 112 920*                   | 112 920*                   | Requesting publication of SIR prior to Examiner action                     |          |
| 113 1,840*                 | 113 1,840*                 | Requesting publication of SIR after Examiner action                        |          |
| 115 110                    | 215 55                     | Extension for reply within first month                                     |          |
| 116 390                    | 216 195                    | Extension for reply within second month                                    |          |
| 117 890                    | 217 445                    | Extension for reply within third month                                     |          |
| 118 1,390                  | 218 695                    | Extension for reply within fourth month                                    |          |
| 128 1,890                  | 228 945                    | Extension for reply within fifth month                                     |          |
| 119 310                    | 219 155                    | Notice of Appeal   |          |
| 120 310                    | 220 155                    | Filing a brief in support of an appeal                                     |          |
| 121 270                    | 221 135                    | Request for oral hearing   |          |
| 138 1,510                  | 138 1,510                  | Petition to institute a public use proceeding                              |          |
| 140 110                    | 240 55                     | Petition to revive - unavoidable   |          |
| 141 1,240                  | 241 620                    | Petition to revive - unintentional   |          |
| 142 1,240                  | 242 620                    | Utility issue fee (or reissue)   |          |
| 143 440                    | 243 220                    | Design issue fee   |          |
| 144 600                    | 244 300                    | Plant issue fee  |          |
| 122 130                    | 122 130                    | Petitions to the Commissioner  |          |
| 123 50                     | 123 50                     | Petitions related to provisional applications                              |          |
| 126 240                    | 126 240                    | Submission of Information Disclosure Stmt                                  |          |
| 581 40                     | 581 40                     | Recording each patent assignment per property (times number of properties) |          |
| 146 710                    | 246 355                    | Filing a submission after final rejection (37 CFR § 1.129(a))              |          |
| 149 710                    | 249 355                    | For each additional invention to be examined (37 CFR § 1.129(b))           |          |
| 179 710                    | 279 355                    | Request for Continued Examination (RCE)                                    |          |
| 169 900                    | 169 900                    | Request for expedited examination of a design application                  |          |

Other fee (specify) \_\_\_\_\_

\* Reduced by Basic Filing Fee Paid

SUBTOTAL (3) (\$)

**SUBMITTED BY**

Complete (if applicable)

|                   |                 |                                  |           |           |                |
|-------------------|-----------------|----------------------------------|-----------|-----------|----------------|
| Name (Print/Type) | Patrea L. Pabst | Registration No (Attorney/Agent) | 31,284    | Telephone | (404) 873-8794 |
| Signature         |                 | Date                             | 3/16/2001 |           |                |

**WARNING: Information on this form may become public. Credit card information should not be included on this form. Provide credit card information and authorization on PTO-2038.**

Burden Hour Statement: This form is estimated to take 0.2 hours to complete. Time will vary depending upon the needs of the individual case. Any comments on the amount of time you are required to complete this form should be sent to the Chief Information Officer, U.S. Patent and Trademark Office, Washington, DC 20231. DO NOT SEND FEES OR COMPLETED FORMS TO THIS ADDRESS. SEND TO: Assistant Commissioner for Patents, Washington, DC 20231.

**IN THE UNITED STATES PATENT AND TRADEMARK OFFICE**

Applicants: Carl Arne Krister Borrebaeck and Roland Carlsson

Serial No.: Express Mail Label No.: EL 709 416 588 US

Filed: March 16, 2001 Date of Deposit March 16, 2001

For: METHODS OF MAKING AND USING MICROARRAYS OF  
BIOLOGICAL MATERIALS

BOX PATENT APPLICATION  
Assistant Commissioner for Patents  
Washington, D.C. 20231

**EXPRESS MAIL TRANSMITTAL LETTER  
FOR PATENT APPLICATION AND CERTIFICATE OF MAILING**

Sir:

Pursuant to 35 U.S.C. § 21(a) as amended by Public Law 97-247 and 37 C.F.R. § 1.10, applicants enclose for filing the attached patent application entitled "*Methods of Making and Using Microarrays of Biological Materials*", which claims priority to U.S. Provisional Application Serial No. 60/192,256 filed March 27, 2000, and which claims priority to foreign application No. GB 0006425.3, which was filed in the United Kingdom on March 17, 2000. The application includes 1 page of abstract, 34 pages of specification, 3 pages of claims, an unexecuted Declaration for Patent Application, an unexecuted Power of Attorney or Authorization of Agent, and an unexecuted Statement Under 37 C.F.R. § 3.73(b). The executed Declaration, Power of Attorney or Authorization of Agent, Statement Under 37 C.F.R. § 3.73(b), and an Assignment from Carl Arne Krister Borrebaeck and Roland Carlsson to BioInvent International AB will be submitted shortly.

A check in the amount of \$818.00 to cover the filing fee is enclosed.

*"Methods of Making and Using Microarrays of Biological Materials"*  
Filed: March 16, 2001  
Express Mail Transmittal Letter for  
Patent Application and Certificate of Mailing  
Express Mail Label No.: EL 709 416 588 US  
Date of Deposit: March 16, 2001

This application is not entitled to claim small entity status under 37 C.F.R. § 1.27.

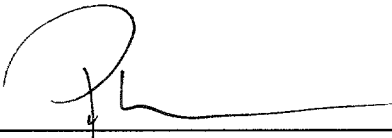
This application is being filed on March 16, 2001, by mailing the application to the Assistant Commissioner for Patents, Washington, D.C. 20231 via the United States Postal Service "Express Mail Post Office to Addressee" service under 37 C.F.R. § 1.10. The Express Mail label number appears in the heading of this paper which is attached to the application papers pursuant to 37 C.F.R. § 1.10(b).

The Commissioner is hereby authorized to charge any fees that may be required, or credit any overpayment to Deposit Order Account No. 01-2507. To facilitate this process, applicants have enclosed a duplicate of this letter.

All correspondence concerning this application should be mailed to:

Patrea L. Pabst, Esq.  
ARNALL GOLDEN & GREGORY, LLP  
2800 One Atlantic Center  
1201 West Peachtree Street  
Atlanta, Georgia 30309-3450

Respectfully submitted,

  
\_\_\_\_\_  
Patrea L. Pabst  
Reg. No. 31,284

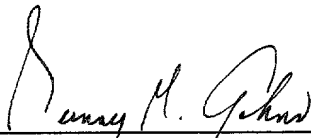
Date: March 16, 2001  
ARNALL GOLDEN & GREGORY, LLP  
2800 One Atlantic Center  
1201 West Peachtree Street  
Atlanta, Georgia 30309-3450  
(404) 873-8794  
(404) 873-8795 Telefax

*"Methods of Making and Using Microarrays of Biological Materials"*  
Filed: March 16, 2001  
Express Mail Transmittal Letter for  
Patent Application and Certificate of Mailing  
Express Mail Label No.: EL 709 416 588 US  
Date of Deposit: March 16, 2001

### **CERTIFICATE OF MAILING UNDER 37 C.F.R. § 1.10**

I hereby certify that this Express Mail Transmittal Letter for Patent Application and any documents referred to as attached therein are being deposited with the United States Postal Service on this date, March 16, 2001, in an envelope as "Express Mail Post Office to Addressee" service under 37 C.F.R. § 1.10, mailing label number EL 709 416 588 US, addressed to BOX PATENT APPLICATION, Assistant Commissioner for Patents, Washington, D.C. 20231.

Date: March 16, 2001

  
\_\_\_\_\_  
Sunny G. Johns

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**STATEMENT UNDER 37 CFR 3.73(b)**Applicant/Patent Owner: Carl Arne Krister Borrebaeck and Roland CarlssonApplication No./Patent No.: \_\_\_\_\_ Filed/Issue Date: March 16, 2001Entitled: METHODS OF MAKING AND USING MICROARRAYS OF BIOLOGICAL MATERIALSBioInvent International AB, a Corporation  
(Name of Assignee) (Type of Assignee, e.g., corporation, partnership, university, government agency, etc.)

states that it is:

1. ☒ the assignee of the entire right, title, and interest; or
2. ☐ an assignee of less than the entire right, title and interest.  
The extent (by, percentage) of its ownership interest is \_\_\_\_\_ %

in the patent application/patent identified above by virtue of either:

- A. [☒] An assignment from the inventor(s) of the patent application/patent identified above. The assignment was recorded in the United States Patent and Trademark Office at Reel \_\_\_\_\_, Frame \_\_\_\_\_, or for which a copy thereof is attached.

OR

- B. [ ] A chain of title from the inventor(s), of the patent application/patent identified above, to the current assignee as shown below:

1. From: \_\_\_\_\_ To: \_\_\_\_\_  
The document was recorded in the United States Patent and Trademark Office at Reel \_\_\_\_\_, Frame \_\_\_\_\_, or for which a copy thereof is attached.

2. From: \_\_\_\_\_ To: \_\_\_\_\_  
The document was recorded in the United States Patent and Trademark Office at Reel \_\_\_\_\_, Frame \_\_\_\_\_, or for which a copy thereof is attached.

3. From: \_\_\_\_\_ To: \_\_\_\_\_  
The document was recorded in the United States Patent and Trademark Office at Reel \_\_\_\_\_, Frame \_\_\_\_\_, or for which a copy thereof is attached.

[ ] Additional documents in the chain of title are listed on a supplemental sheet.

- [ ] Copies of assignments or other documents in the chain of title are attached.

[NOTE: A separate copy (i.e., the original assignment document or a true copy of the original document) must be submitted to Assignment Division in accordance with 37 CFR Part 3, if the assignment is to be recorded in the records of the USPTO. See MPEP 302.08]

The undersigned (whose title is supplied below) is authorized to act on behalf of the assignee.

\_\_\_\_\_  
Date\_\_\_\_\_  
Typed or printed name\_\_\_\_\_  
Signature\_\_\_\_\_  
Title